

Process for the preparation of heterologous bispecific antibodies

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Applicant(s):

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- **European:** C07K16/46D

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 JP3400457 (B2)
 DE4419399 (C1)
 EP0763128 (A1)
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 AT187176 (T)

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Abstract not available for JP 9506001 (T)

Abstract of corresponding document: **DE 4419399 (C1)**

The invention pertains to a method for producing heterologous bispecific antibodies. The object of the invention is a method designed to yield heterologous bispecific antibodies with a high level of purity. This is attained by producing a quadroma fused from hybridomas, one of which produces antibodies that have an affinity to the binding site of protein A and the other of which produces antibodies that have a weaker or no affinity to the binding site of protein A; by propagating and cultivating the quadromas as usual, and by eluting the bsAk in a pH range at least 0.5 units above the pH at which the antibodies with greater affinity to the binding site of protein A are still bonded.

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(87) 国際公開番号	WO 95/33844	(74) 代理人	弁理士 矢野 敏雄 (外3名)
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(54) 【発明の名称】 異種二重特異性抗体の製造法

(57) 【要約】

本発明は、異種二重特異性抗体の製造法に関する。本発明の課題は、高い純度での異種二重特異性抗体を製造することができるような方法を実施することである。前記課題は、1つのハイブリドーマが、蛋白質Aの結合ドメインに対する親和性を有する抗体を生産し、別のハイブリドーマは、第一の抗体と比べて、蛋白質Aの結合ドメインに対して弱い親和性を有するかまたは親和性を有していない抗体を生産するようなハイブリドーマから融合されたクアドロームの製造、該クアドロームの常法による増殖および培養並びに蛋白質Aの結合ドメインに対してより強い親和性を有する抗体がなお結合している pH を少なくとも 0.5 単位上回っている pH 範囲内での b s A k の溶離によって解決される。

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【図 1】

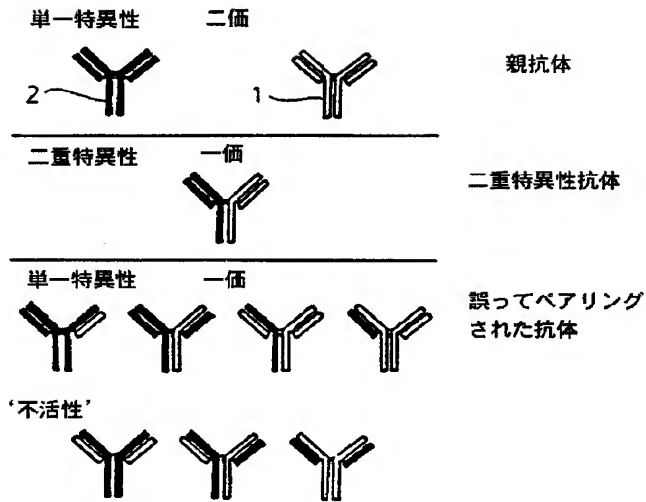
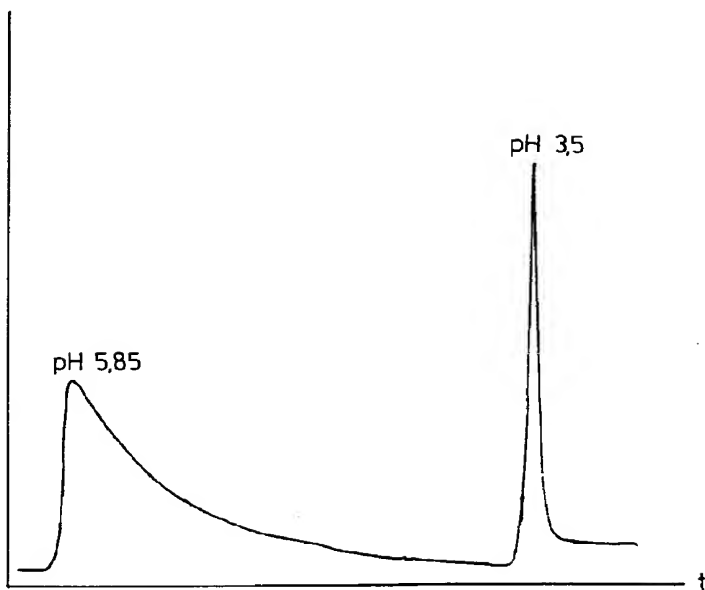


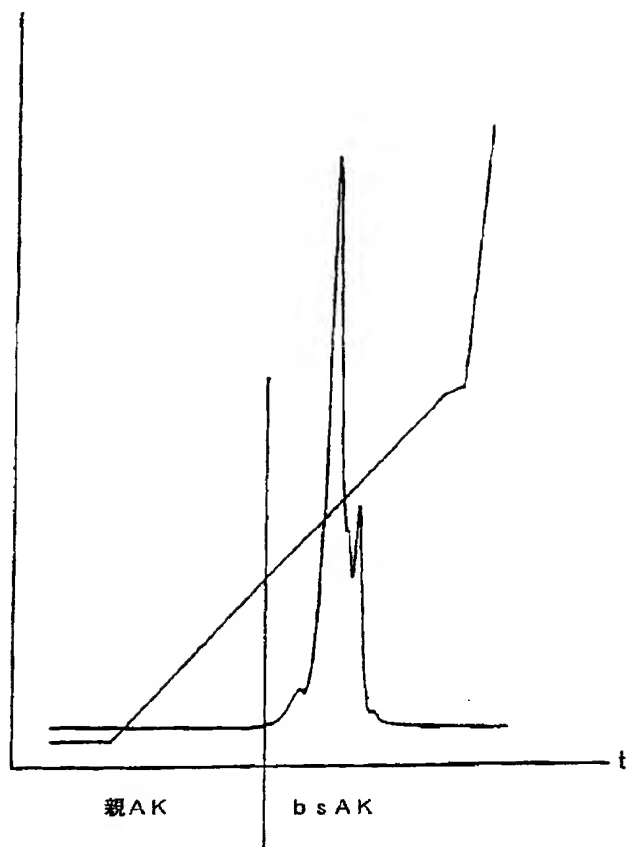
Fig. 2

O.D.280



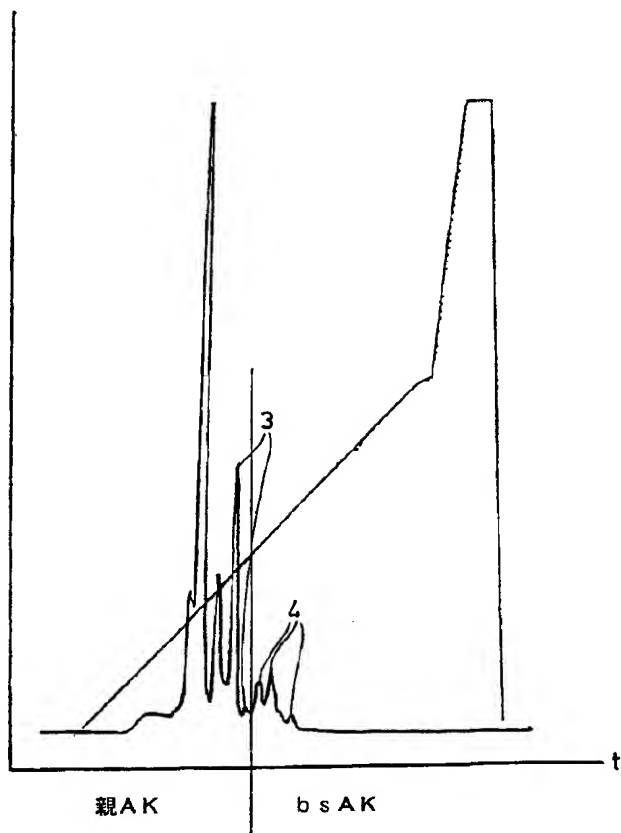
【図 3】

O.D. 280



【図 4】

O.D. 280



INTERNATIONAL SEARCH REPORT

International Application No.
PCT/EP 95/01850

A. CLASSIFICATION OF SUBJECT MATTER
IPC 6 C12P21/08 C07K1/22 C07K16/46

According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

IPC 6 C12P C07K

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practical, search terms used)

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	GB,A.2 197 323 (NATIONAL RESEARCH DEVELOPMENT CORPORATION) 18 May 1988 see examples 2,6 see claims ---	1-4
X	GB,A.2 197 322 (NATIONAL RESEARCH DEVELOPMENT CORPORATION) 18 May 1988 see examples 5,9 see claims --- -/-	1

☒ Further documents are listed in the continuation of box C.

☒ Patent family members are listed in annex.

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INTERNATIONAL SEARCH REPORT

Intern. Appl. No.
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C.(Combination) DOCUMENTS CONSIDERED TO BE RELEVANT		
Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
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INTERNATIONAL SEARCH REPORT

Continuation on patent family members

International Application No
PCT/EP 95/01850

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		JP-T- 1501201	27-04-89

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